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IN RE WHITE'S OPERATION FOR HYPERTROPHIED PROSTATE.

To the Editor of THE MEDICAL NEWS,

SIR: Dr. Belfield, in the *Journal of the American Medical Association* of March 9, 1895, and Dr. Bangs, in the *Medical Record* of April 6, 1895, published under the heading "Warning against Castration for Prostatic Enlargement," communications which, while they express some views with which I am in entire accord, contain, on the other hand, statements that hardly seem justified by the facts now before the profession.

No one could deprecate more than I the indiscriminate performance of the operation. I suggested it with great caution, laying before the American Surgical Association the line of thought and the experimental work that seemed to me to give the idea scientific standing. More recently I wrote (*British Medical Journal*, January 5, 1895; THE MEDICAL NEWS, Dec. 22, 1894) that while the evidence then existing obviously and amply justified the original suggestion, I desired to call attention to the fact that I had not made it without hesitation. I added that, "having observed with disapprobation the undiscriminating assaults of some extremists upon the urethra, the tubes, and the ovaries, and more recently upon the appendix, I did not want to be responsible for a similar attack upon the testicles," and that I knew that "the step from experiment to operation is and should be a long one, and felt the responsibility involved in proposing a new operation, and especially one of this character—easy of performance, with a low mortality, and intended for the relief of a condition of enormous frequency."

I am still most desirous of having the operation confined within its proper limits, and to this extent am in sympathy with the gentlemen mentioned.

But when Dr. Belfield says that while it is admitted that "castration may cause atrophy of glands, subsidence of edema, and relief of distress, but that it will not reduce the hypertrophied connective tissue is *à priori* probable;" and Dr. Bangs writes that "a theoretical operation, based upon observations upon dogs and eunuchs, in whom physiological atrophy of the prostate is said to be induced by the abrogation of its sexual function, cannot reasonably be applied with the expectation of getting the same results in elderly men in whose prostates hyperplasia has already taken place," and reiterates that the operation "is based on theory alone," they seem to me to ignore existing and conclusive evidence. This is now complete in every particular as regards the effect of bilateral castration on the majority of hypertrophied prostates. The experimental and theoretic stage has long since been passed. I have in my possession sections of a prostate taken from a patient that died after, but not because of, the operation, which show clearly that it *does* reduce the entire gland, and that the hypertrophied connective tissue shrinks and dwindles after the earlier disappearance of the glandular elements. But that this assertion may not rest on my statement I would quote Mr. Joseph Griffiths, F.R.C.S., Hunterian Professor of Surgery and Pathology in the Royal College of Surgeons, England, who has recently reported on the condition of an enlarged prostate eighteen days after double castration. He describes in detail and figures (*British Medical Journal*, March 16, 1895) the changes which had taken place, summing up as follows: "In short, the cell-elements first proliferate, and ultimately disappear, leaving a comparatively small amount of fibrous connective tissue in their place. . . . The gland, whether enlarged or normal, undergoes certain

degenerative changes after removal of the testicles which lead to its conversion into a small, tough, and fibrous mass in which there are only remains of the glandular tubules and ducts."

As to the clinical evidence Dr. Bangs urges that, to test the results of the operation, "the size of the prostate should be determined by three examiners, and the examinations repeated with sufficient frequency to determine positively the size of the organ." These conditions, which are somewhat rigid, have been complied with in all my own cases, in one of which the estimated shrinkage of the size of the prostate from that of a small orange to that of a walnut took place in a week. A half-dozen examiners confirmed this, and several hundred medical students saw the patient and learned directly from him of the concomitant and remarkable improvement in his symptoms. Dr. Lilienthal, of New York, two weeks after the publication of Dr. Bangs's letter, published the report of a case (*The Medical Record*, April 20, 1895) which so completely answers all Dr. Bangs's theoretic objections as to be conclusive in itself. I may add, however, that I have now notes of similar cases to the number of nearly one-hundred, in most of which all previous palliative treatment had failed, and in which the results have been equally striking. It seems to me too late to say, as Dr. Bangs does, that the relief appearing within a few hours has been too positive to be attributed to the operation itself, because "it hardly seems rational to believe that a hyperplastic organ in which, no doubt, there has been an increase of the connective-tissue element, should diminish in size within a few hours after castration has been performed." The facts are against him. The hyperplastic organs do diminish in size, and often in an almost incredibly short space of time.

Both the gentlemen who have been moved to warn the profession emphasize the possibility of mistake in

diagnosis, Dr. Belfield going so far as to say that "whenever a case of real or supposed prostatic enlargement demands operative relief this should always be an incision into the bladder." I am quite willing to admit that there must be some doubtful cases, and that in these and in a certain proportion in which the diagnosis is certain a cystotomy will often be desirable. But it is assuming altogether too much to claim that this is "always" proper. I have not found the great majority of cases of prostatic hypertrophy difficult of recognition nor of classification by combined rectal and instrumental exploration. But if I may be thought to be mistaken as to this and other similar questions raised by these gentlemen, it is hardly likely that Fenwick and Moullin and Griffiths in England, Bereskin in Russia, Helferich and Meyer and Hænel in Germany, Ramm in Norway, Watson and Warren in Boston, Halsted and Finney in Baltimore, McBurney and Stimson and Pilcher in New York, Andrews in Chicago, Souchon in New Orleans, Walker in Detroit, Haynes in Los Angeles, and dozens of other surgeons of more or less prominence have been wrong as to their diagnosis, or in saying that previous palliative treatment has failed, or unreliable in their descriptions of the rapid and sometimes astounding shrinking of the gland and disappearance of the subjective symptoms, even including long-standing cystitis. They are all now on record to this general effect at any rate.

Dr. Belfield alludes to a case in which a patient with a large prostate, "evidently inflammatory," and severe cystitis, was found, by suprapubic incision, to have a small calculus, previously undetected. He adds: "Prolonged vesical drainage was followed by great reduction of the prostatic enlargement and by a symptomatic cure." He then imagines with apparent horror the status —professional and legal—of the surgeon, who might have done castration, when the calculus was subse-

quently discovered. This sort of argument appears to me to be misleading, as it lacks necessary detail. The age of the patient, indicating the value of the testicles from a sexual standpoint; the relation of the calculus to the enlargement of the prostate—*i. e*, whether cause, which would be rare, or effect, which would be common; the period indicated by the word "prolonged"; the presence or absence of a urinary fistula; and the exact condition called a "symptomatic cure," should all be known before any such comparison could be drawn. I mention the case because in a gentleman, aged seventy-six years, with a large prostatic hypertrophy and a secondary calculus, which had formed after a previous litholapaxy, and which lay in a deep post-prostatic pouch, I have within the last month deliberately performed castration as a primary operation. Two weeks later, the prostate having shrunken to one-sixth its former bulk, the residual urine having disappeared, and the cystitis (in spite of the presence of the calculus) having almost vanished, I crushed and evacuated the stone. The patient was sent to me by Dr. Schum, of Huntingdon. He went home free from all symptoms.

Dr. Belfield says, finally, that "the claim that double castration is safer than drainage, is not, in his experience, warranted, if drainage be made either by perineal urethrotomy or suprapubic incision in *deux temps;* the danger in cases that really demand operative interference is the anesthetic, not the knife." But drainage in most cases is only a palliative measure, and, if permanent, is a source of more or less continued danger and of great discomfort to the patient. Dr. Belfield has very properly described it under the head of "Palliative Operations" in an article that he has published elsewhere. It is not fair, therefore, to compare it at all with a measure that in properly selected cases is curative, and which thus challenges comparison with the various forms of prostatectomy. He might almost as well have written

of the mortality of catheterism, which also gives great relief in some cases. As to the anesthesia, as double castration can easily be performed within three minutes, it seems unlikely that any serious objection to the operation will prevail on that account. I have on several occasions completed it in a little less than three minutes before the class at the University of Pennsylvania, and without undue haste. In regard to the general question of mortality, however, I may be pardoned for quoting from a personal letter from Sir Joseph Lister, who writes me: "I am glad to see from the cases that have been published that your remedy has proved so effectual in this most distressing class of patients. If I have any fault to find with you in speaking of the advantages of your procedure, it is that you seem to me to underrate them when you say that castration is an operation of little danger. You might, I think, have truly said that if it is performed with sufficient antiseptic precautions it is entirely free from danger. The *rapidity* of the relief afforded seems to me as remarkable as it is satisfactory. Allow me to congratulate you cordially on this valuable addition to our art."

My personal and professional regard for the gentlemen who have criticised the operation, and my knowledge of their sincerity of purpose, have led me to reply at such length; but I also have been actuated by a desire to have both its merits and demerits kept fairly before the profession. There is much yet to be determined in regard to it, especially as to the selection of suitable cases and as to its remote effects; but I think I may fairly claim that the existing evidence—experimental, pathologic, and clinical—removes it from the region of theory and speculation, and demonstrates its applicability to a large proportion of cases of hypertrophy of the prostate.

Dr. Bangs's statement that "if this theory could be proven, about one man in three, after the age of fifty,

ought to submit to castration in order to prevent enlargement of his prostate," is an extension of the operative field which must be regarded as peculiarly his own. I have as yet not considered the subject from the standpoint of early prophylaxis. As the theory *is* proved, it would be interesting to know how Dr. Bangs proposes to select his cases. Very respectfully,

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